United States
Environmental Protection
Agency

Office of Public Affairs
Region 5
77 West Jackson Boulevard
Chicago, Illinois 60604-3590

Illinois, Indiana
Michigan, Minnesota
Ohio, Wisconsin

U.S. EPA Proposes Cleanup Plan for Lead Battery Recycler Site

Toledo, Ohio **June 1998**

Opportunities for Public Involvement

Public Meeting

U.S. EPA will sponsor a public meeting for the residents of Toledo to explain the recommended action plan and the alternatives presented in the EE/CA. Oral and written comments will also be accepted at the meeting.

Date:
Wednesday, June 24, 1998

Time:
7 p.m.

Place:
Holland Branch Library
1032 South McCord Road
Holland, Ohio

Public Comment Period

U.S. EPA will accept written comments on its recommended alternative presented in the EE/CA during a 30-day public comment period:

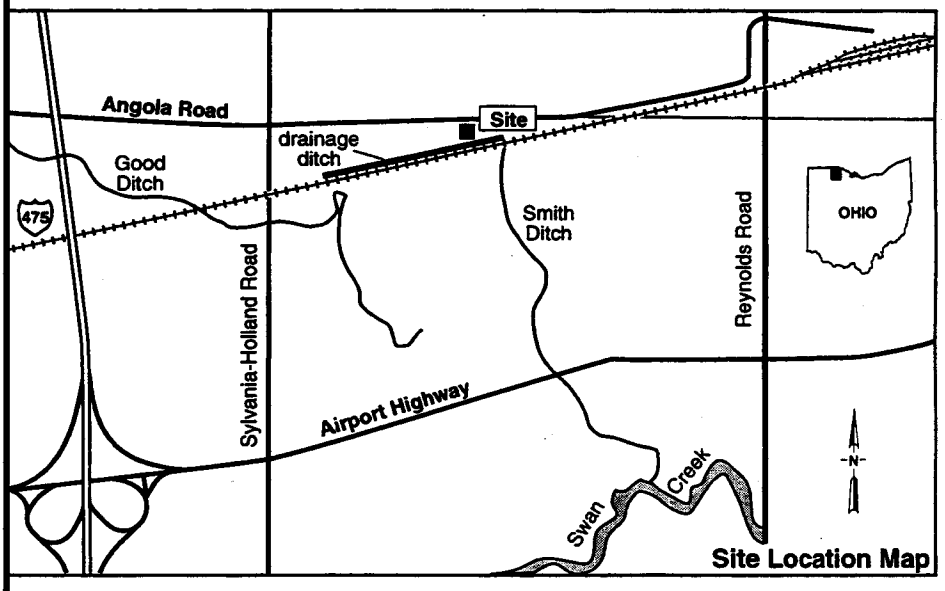
June 8 to July 8, 1998

INTRODUCTION

The U.S. Environmental Protection Agency (U.S. EPA) has approved a study called an Engineering Evaluation/Cost Analysis (EE/CA) for the Lead Battery Recycler site in Toledo, Ohio. The EE/CA analyzed and compared six cleanup alternatives for lead-contaminated soil and sediment.

This Proposed Plan announces U.S. EPA's recommended cleanup alternative—Excavation to Industrial Standards and Off-Site Disposal. This Proposed Plan explains this alternative and describes why it is being recommended. It also lists other alternatives that were considered by U.S. EPA. A detailed description of the recommended alternatives and other alternatives reviewed is in the EE/CA.[1]

Public input on U.S. EPA's recommended alternative is important to the cleanup process. Based on new information obtained through public comment, U.S. EPA may modify its recommended alternative or select another alternative presented in this Proposed Plan. The public is encouraged to review and comment on U.S. EPA's recommended alternative.

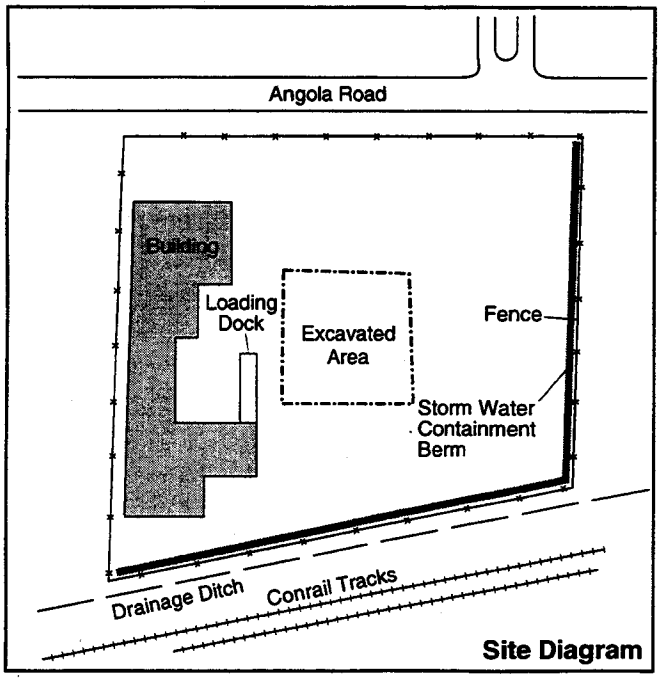


[1] *Section 300.415 (b)(4)(i) of the National Oil and Hazardous Substances Pollution Contingency Plan (NCP) and Section 113(k)(2) of the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) requires publication of a notice describing U.S. EPA's recommended alternative. The EE/CA must also be made available to the public for comment. This Proposed Plan is a summary of information contained in the EE/CA for the Lead Battery Recycler site. Please consult the EE/CA for more detailed information.*

SITE BACKGROUND

The Lead Battery Recycler Superfund site is located at 5715 Angola Road, Lucas County, Toledo, Ohio. The site is on the south side of Angola Road approximately 2,000 feet east of Holland-Sylvania Road (see Site Location Map on page 1). The site and its surrounding area are a combination of industrial and residential properties. The site is bordered to the north by Angola Road, to the west by Able Equipment Inc., to the south by a drainage ditch and Conrail railroad tracks, and to the east by World Energy Systems of Toledo, Inc. The Westbrook Mobile Home Park is located directly across Angola Road from the site, and across the Conrail tracks south of the site there are newer single- and multiple-family housing units. Approximately 4,045 people live within a one-mile radius of the site.

The site is approximately 2.67 acres and is secured by a 6-foot-high chain-link fence topped with barbed wire. A concrete block and prefabricated sheet metal building is situated on the west side of the site. The building contains offices, a locker room, operations area and a concrete loading ramp (see Site Diagram below).



Site Diagram

Detroit Lead Recyclers, an Ohio partnership, owns the site. From December 1981 to early 1983, Detroit Lead Recyclers and/or Galena Industries, Ltd., Inc., an Ohio corporation, operated the site as a lead battery recycling facility.

While in operation, the facility received spent lead acid batteries from numerous locations and companies. The batteries were broken apart and drained of spent acid; then, the lead, lead oxide, polypropylene casings, and hard rubber pieces were separated out and sold as raw materials for the manufacturing of new products. The amount of hazardous materials that potentially contaminated the site is unknown. The facility has been abandoned and vacant since early 1983.

Removal Action

U.S. EPA monitored a removal action that was conducted in 1994 and 1995. The primary objective was to remove drums, stockpiles, and a select area of soil containing lead. Thirty 55-gallon drums were transported off site for treatment and disposal. Nearly 500 tons of lead-contaminated soil was transported off site for treatment and disposal. A total of 117.21 tons of lead-containing waste were transported off site for treatment and disposal. The removal action also included:

- Decontamination of process equipment and the floors of the building.
- Decontamination of two catch basins and installation of silt fencing.
- Construction of a berm along the east and south property boundaries of the site to prevent off-site movement of surface water.

EE/CA Activities

Samples were collected from May 19 - June 4, 1997 to determine the nature and extent of lead contamination at the site so cleanup alternatives could be evaluated, and a removal action could be selected. The investigation included soil, sediment, surface-water, and ground-water samples. High levels of lead were found in soil and sediment but not in surface water or ground water. The EE/CA report was finalized in November 1997.

SUMMARY OF SITE RISK

A streamlined risk assessment, which is a focused evaluation of the risk posed to human health and/or the environment by the presence of specific pollutants, was conducted as part of the EE/CA. Lead was identified as the primary contaminant of concern based on historic sampling at the site.

Lead is a probable cancer-causing contaminant and is known to cause developmental problems in children. The primary exposure "pathway" considered is incidental ingestion of soil, which occurs when children get dirt on their hands and then put their hands in their mouths.

The site is zoned industrial and is fenced. Because it is unlikely the property would be developed for residential use in the future, an "industrial-use" cleanup goal for lead was established in the streamlined risk assessment. This level is 1,540 parts per million (ppm). This level of lead in soil is considered to be safe for future workers at the site.

Two areas contaminated by the site and located outside the fence will be cleaned up to a "residential" standard. The residential standard of 400 ppm was established based on U.S. EPA policy. The two areas outside the fence

are between the site fence and Angola Road and a drainage ditch located on the south side of the site which runs along the Conrail tracks. Cleaning up soil to the residential standard of 400 ppm is considered to be safe for areas on which small children play, such as a residential backyard.

RECOMMENDED ALTERNATIVE

Alternative 2B—Excavation to Industrial Standards and Off-Site Disposal is the recommended cleanup alternative. This alternative includes excavation, removal, and off-site disposal with solidification/ stabilization treatment to meet Land Disposal Restrictions for soil and sediment exceeding the industrial standard of 1,540 ppm lead, backfill with clean soil to fill any voids created during soil or gravel and sediment removal, regrade to promote drainage, and seed, if necessary.

Alternative 2B is considered the most favorable of all alternatives because it meets the requirements of all of U.S. EPA's evaluation criteria (see box above), and it does not require the use of institutional controls upon completion of the removal action. The site can be used for any industrial activity following the removal action and would not require any additional action or follow-up maintenance. Although Alternative 2B is not the least expensive (nor the most expensive), it proves to be the most favorable alternative for protecting human health and the environment.

Although the EE/CA recommends Alternative 2A, U.S. EPA recommends Alternative 2B because it is unlikely that the property will be developed for residential use.

Evaluating the Alternatives

U.S. EPA typically uses three criteria to compare the cleanup alternatives in the EE/CA and to recommend a practical cleanup alternative. The evaluation criteria consists of:

1. **Effectiveness**—considers the length of time needed to implement a cleanup alternative and the risks the alternative poses to workers, residents, and the environment during implementation.

2. **Implementability**—considers the technical and administrative feasibility of implementing the cleanup alternative, such as the availability of goods and services.

3. **Cost**—includes estimated capital, operation, and maintenance costs, as well as present worth costs. Present worth cost is an alternative's total cost over time in terms of today's dollars.

OTHER ALTERNATIVES CONSIDERED

The EE/CA reviewed six removal action alternatives.

Alternative 1

- Alternative 1A—Soil Washing to Residential Standards.
  Cost: $990,000 to $1.3 million.
- Alternative 1B—Soil Washing to Industrial Standards.
  Cost: $670,000 to $930,000.

Alternative 2

- Alternative 2A—Excavation to Residential Standards and Off-Site Disposal.
  Cost: $520,000 to $730,000.
- Alternative 2B—Excavation to Industrial Standards and Off-Site Disposal. This is the U.S. EPA-recommended alternative, see previous section.
  Cost: $490,000 to $640,000.

Alternative 3

- Alternative 3A—On-Site Solidification/Stabilization to Residential Standards.
  Cost: $420,000 to $540,000.
- Alternative 3B—On-Site Solidification/Stabilization to Industrial Standards.
  Cost: $290,000 to $360,000.

Alternative 4

- Excavation and Off-Site Disposal to Industrial Standards and Surface Capping.
  Cost: $980,000 to $1.3 million.

Alternative 5

- Surface Capping.
  Cost: $520,000 to $522,000.

Alternative 6

- No Action. The no-action alternative is included for comparison with other removal action alternatives.
  Cost: $0.

THE NEXT STEP

U.S. EPA will consider public comments received during the public comment period (June 8 to July 8, 1998) before selecting a final cleanup plan for contaminated soil and sediment. The cleanup plan will be described in a final decision document that will be available for public review.

After the final action is chosen for the contaminated soil and sediment, U.S. EPA will meet with the parties believed responsible for the site contamination and request that they fund the cleanup. Following negotiations, the final action will be designed and implemented.

Additional Information

If you have questions about the information in this Proposed Plan or would like additional information about the Lead Battery Recycler site, please contact:

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Toll Free: (800) 621-8431 (10 a.m. - 5:30 p.m. EST, weekdays)

The EE/CA and other U.S. EPA information are available for review in the site Information Repository at:

Reynolds Corners Branch Library
4833 Dorr Street
Toledo, Ohio

An Administrative Record, which contains the information upon which the selection of the cleanup plan will be based, has been established at the Toledo Public Library, Main Branch, Science and Technology Department, 325 Michigan Street, and at the U.S. EPA Records Center, Chicago, Illinois.

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